

REMARKS

Claim 2 is objected to for improper dependency and has been amended to change the dependency thereof from claim 2 to claim 7.

Claims 2-23 are finally rejected under 35 U.S.C. §103 as being unpatentable over various combinations of Johnson et al., Pottebaum, DeLuca, Jo and Hoppal et al., all of record. In support of the rejection, the examiner contends that DeLuca teaches “a disk drive assembly (200, fig. 1) having its bottom side disposed in contact with one surface of the base wall of a bracket...and a disk drive assembly (186, fig. 1) having its bottom side disposed in contact with one surface of the base wall of a bracket...”. In fact, the items 200 and 186 of DeLuca are not disk drive assemblies, but are rather brackets for storage devices (column 4, line 63 and column 5, lines 2-3), the storage devices themselves not being shown.

A significant aspect of the invention is the provision of a combination of a disk drive assembly and a channel-shaped, damped mounting bracket therefore, wherein the disk drive assembly has an integral printed circuit board (“PCB”) thereon, the parts being arranged so that the PCB faces toward the base wall of the channel-shaped bracket. No such arrangement is disclosed or suggested by any of the cited references. As regards DeLuca, it makes no mention of the PCB of a disk drive assembly, nor does it make any mention of the orientation of the storage devices within the brackets 186 and 200. Thus, it cannot supply a teaching of a disk drive PCB facing the base wall of a channel-shaped, damped mounting bracket.

Furthermore, there is nothing in any of the cited references which would provide a suggestion or motivation for one of ordinary skill in the art to so orient a disk drive and associated mounting bracket. This is because there is no suggestion in the art of record of any recognition of any significance to the orientation of the disk drive relative to its mounting bracket. That significance is set forth only in applicants’ disclosure.

Submitted herewith is a Declaration of Richard K. Williams, one of the inventors of the subject application, regarding a report which he authored comparing the noise-damping characteristics of various types of noise-damping mounting arrangements, as compared to a base line mounting arrangement for a disk drive. As Mr. Williams notes, one of the results of the tests summarized in the report, is that the composite sound power emanating from the PCB side of the disk drive alone (without mounting assembly) is significantly greater than that emanating from the top side, a fact which had not theretofore been recognized in the design of disk drive mounting arrangements. Having discovered this fact, applicants included among the various test arrangements, arrangements wherein the disk drive assembly is inverted, with its PCB side disposed facing the mounting bracket, rather than the standard arrangement with its top side facing the mounting bracket. Significantly, the test showed that this inversion resulted in a significant decrease in composite sound power emanating from the disk drive/mounting bracket system.

Accordingly, applicants' invention consists of first recognizing that the composite power emanating from the PCB side of the disk drive is greater than from the top side, and utilizing this recognition to devise the claimed arrangement of the disk drive and mounting bracket to enhance sound-damping characteristics of the arrangement. Without a recognition of the difference between the sound power generated from the opposite sides of the disk drive, one of ordinary skill in the mounting bracket art would have no reason to adopt applicants' claimed mounting arrangement, nor could that arrangement possibly have been obvious to such a person.

For all of the foregoing reasons, it is submitted that claims 2-23 are now in condition for allowance and, accordingly, it is respectfully requested that the rejection of those claims be reconsidered and withdrawn.

Respectfully submitted,

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